



User's Guide

Infra Red Dryer for Mutoh Printers



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Dear Customer,

When using a take-up system in combination with slow drying media, applying a lot of ink and/or printing at high speed, the Infra Red Dryer for large-format inkjet printers will vastly improve drying of your printed media before it is being rolled up.

The Infra Red Dryer heating element will dry the output uniformly across the entire surface, without air circulation. Ink will dry faster without losing colour gamut, improving productivity.

The Infra Red Dryer is available in a width of:

- 64 inch (1625 mm)
- 72 inch (1828.8 mm)
- 90 inch (2286 mm)
- 108 inch (2743,2 mm)

The system consists of a stand with casters onto which a heating element is mounted. Brackets secure the distance between the heater and the media.

For High-speed production printers, mounting of a second heater onto the stand is made possible. If necessary, the stand can be tilted (7, 6°) to ensure that both heaters are at the same distance towards the media.

Please before using the Infra Red Dryer, be sure to read and understand the content of this manual.

Please contact our service department at BBC Industries (800-654-4205 or service@bbcind.com) with any questions regarding this manual.

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1 INTRODUCTION

After reading this manual, you will be able to install the Infra Red Dryer smoothly.

The complete installation procedure, from unpacking until preparing for a job is described in detail. Please read this procedure carefully to know what to do during the installation at the site.

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2 SAFETY INSTRUCTIONS

Important

- Be sure to follow all instructions and warnings on this manual when using the equipment.

2.1 Warnings, cautions and notes

Safety terms in this manual and the contents of warning labels attached to the Infra Red Dryer are categorized into the following three types depending on the degree of risk (or the scale of accident). Read the following explanations carefully, and follow the instructions in this manual.

Safety terms	Details
Important	Must be followed carefully to avoid death or serious bodily injury
Caution	Must be observed to avoid bodily injury (moderately or lightly) or damage to your equipment
Notes	Contains important information and useful tips on the operation of your Infra Red Dryer

2.2 Important safety instructions

- General safety instructions that must be observed to use the equipment safely are explained below.
- DO NOT LEAVE UNATTENDED. Always make sure that the printed media does not come into contact with the heater element(s). Contact could not only damage your prints but could also cause the media to overheat. Prolonged contact may even cause fire.
- Make sure to connect the power cable only after all the steps of the installation procedure are completed.
- The disconnect device is the plug on the power supply cord.
- Always switch the power OFF when the Infra Red Dryer is not in use.
- Have two or more people unpack and assemble the Infra Red Dryer.
- Have two or more people transport the Infra Red Dryer.
- Do not place the unit in the following areas. Doing so may result in the unit tipping or falling over and causing injury.
 - Unstable surfaces
 - Angled place
 - Areas subject to vibration by other equipment
- Do not place the unit in humid and dusty areas. Doing so may result in electrical shock or fire.
- Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.
- Make sure that the heater control unit is oriented so that it is at the opposite side of the direction of the heater element. Make sure that the control button is facing up.
- Make sure that the cable of the heater control unit is at the outside of the unit.
- Make sure that the recommended power cable is used. Using another cable may result in electric shock or fire.
- Do not use a damaged power cable. Doing so may result in electrical shock.
- Do not attempt to plug in electrical plugs with wet hands. Doing so may result in electrical shock.
- Make sure that the power cable does not come in front or touches the heater element(s). Doing so may result in fire. Use the cable clamp attached to the stand to lock the power cable.
- Use a separate network when using two heater elements. Connecting too many loads on one electrical output could cause fire.

- Do not connect earth cables in the following areas.
 - Gas pipes → doing so may cause fire or an explosion.
 - Earth terminals for telephone line or lightening rod → doing so may cause a large flow of voltage if lightening occurs.
 - Water pipes or faucets → If there is a plastic part in the pipe, the earth will not work properly
- Follow the instructions below when handling the power cable.
 - Do not modify the cable
 - Do not put heavy objects on the cable
 - Do not bend, twist or pull the cord
 - Do not wire the cable near equipment that generates heat
- Follow the instructions below when handling the power plug. Otherwise, fire may occur.
 - Wipe away dust and any other residue before inserting the plug.
 - Ensure that the plug is firmly inserted as far as it will go.
- Be sure to use the specified voltage. Otherwise, electrical shock or fire may occur.
- Use electricity directly from a power outlet. Do not put too many loads on one electrical output. Otherwise, heat may be generated and cause fire.
- Be sure to use an outlet with an earth terminal and use the terminal correctly. Otherwise, electrical shock or fire may occur.
- Ensure that the plug has been disconnected from the power socket when it is not to be used for a long time.
- Earth wires must be connected to wires or terminals that fulfil the conditions below.
 - Earth terminals of power sockets
 - Earth wires with copper morsel that is at least 650 mm under the ground
- Be careful not to touch the heater element(s) during or after operation. Doing so may result in burns. (After powering off, the heater element(s) will remain hot for 15 to 20 minutes).
- Do not hold your hand before the heater element(s) during or after operation. Doing so may result in burns. (After powering off, the heater element(s) will remain hot for 15 to 20 minutes).
- By using an infrared temperature gun, measuring the temperature of the heater element is done safely (without touching the heater element). You can buy this infrared temperature gun in any local technical shop.
- Care needs to be taken when determining the infra Red Dryer location to assure that these waves will be absorbed by the ink and substrate to be cured, and not by other surfaces that could be affected by being warmed.
- Check the specification sheet of the media. Make sure to maximum use a setting 10°C (18 °F) lower than the maximum temperature mentioned on the specification sheet of the media. Use an infrared temperature gun to measure the temperature on the media.
- Overheating can cause media deformation (curling). This can result in contact between the media and the Infra Red Dryer, causing permanent damage or fire. In case of emergency, remove the Infra Red Dryer from the media.
- Do not stand on or place heavy objects on your unit. Doing so may result in the unit tipping or falling over and causing injury.
- Do not cover the unit with cloth, such as a blanket or table cloth. Doing so could cause fire.
- Do not cover the unit with media. Doing so could cause fire.
- Do not use thinner, benzene, alcohol or other active agents. Doing so may result in damage or paint peeling from the casing. Electrical shock or fire may occur.
- Be careful not to spill water inside the unit. Doing so may result in a short circuit.
- Never open the covers fixed with screws. Doing so may result in electrical shock or a malfunction in the unit.
- During operation of the Infra Red Dryer, it is highly recommended to use an Air Purification System. As a result of working with the Infra Red Dryer, solvents evaporate much faster.

3 PACKAGING INFO

Depending on the ordered configuration, the Infra Red Dryer is delivered in 2 or more boxes. There will be at least a box for the stand and a box for the heating element.

⚠ Notes ⚠

- Please check the boxes for anything abnormal (damage etc.) when delivered. If anything seems to be abnormal, please contact your local dealer.
- When unpacking the unit, please check whether all parts are included in the box. Consult your dealer if anything seems to be missing.

3.1 Heating element box

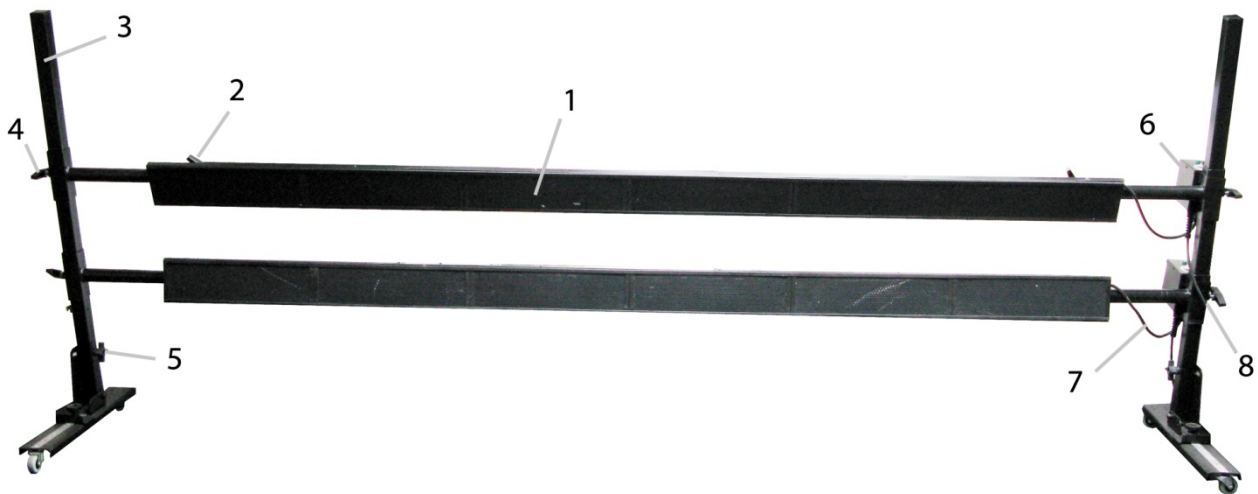


Description	Picture	Qty
Heater element		1
Heater clamp		2
Tube bracket		2
Heater control unit		1
User's Guide		1
Connection tube		1

3.2 Stand box

Description	Picture	Qty
Stand		1

3.3 Getting to know the parts



N°	Name	Description
1	Heater element	Emits heat by using an infrared heating technology.
2	Heater clamp – on heater	To secure the position of the front of the heater element to the media.
3	Stand	Holds the heater element(s).
4	Heater clamp – on stand	To secure the position of the heater element onto the stand.
5	Tilting wheel	To secure the position of the heater element. Two positions: vertical or 7,6° tilted.
6	Heater control unit	To control the temperature. Includes a green light that illuminates when the unit is powered ON.
7	Heater element cable	Cable for the connection between the heater element and heater control unit.
8	Power cable	Connection between the heater control unit and power outlet.

4 ASSEMBLING THE UNIT

⚠ Important ⚠

- Perform all installation steps before connecting the power cable.

⚠ Caution ⚠

- Have two or more people unpack and assemble the Infra Red Dryer.

4.1 The Infra Red Dryer with one heater element



- Step 1 : Place the heater element with the front of the heater element laying flat on a protected surface (e.g.: the cardboard shipping carton).
- Step 2 : Turn the heater clamp at the rear of the heater element counter clockwise to unlock the tube brackets.
- Step 3 : Position the tube brackets so that the rectangular portions are parallel with one another. Turn the heater clamp at the rear of the heater element clockwise to lock the tube brackets.



- Step 4 : Lay the stands flat on the floor so that when stood up they are at the approximately distance needed for connecting to each end of the heater element.

⚠ Caution ⚠

- Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.

- Step 5 : Locate the heater element between the two stands on the floor.
- Step 6 : Each person holds one stand with the masts vertical and the feet parallel.

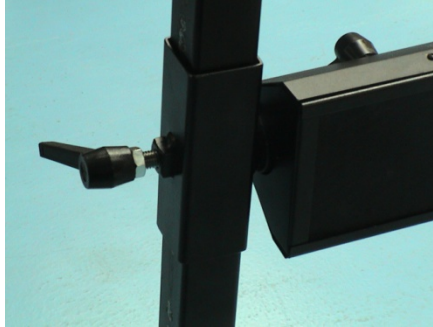
⚠ Caution ⚠

- **Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.**

Step 7 : Use your other hand to simultaneously lift the heater element and slide it over the top of the stand.

Step 8 : Locate the heater element at the desired height above the floor.

Step 9 : Lock one end of the heater element to the stand with one of the heater clamps.



Step 10 : Use the tube level mounted on the rear of the heater element to level it. Once in place, lock it by using the other heater clamp.



Step 11 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

Step 12 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.

Step 13 : Turn the heater clamps clockwise to lock the heater element.

Step 14 : Slide the heater control unit over the right stand.



Step 15 : Connect the heater element cable at the bottom of the heater control unit.

⚠ Caution ⚠

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

⚠ Caution ⚠

- **Make sure that the cable of the heater control unit is at the outside of the unit.**
- **Make sure that during operation the cable does not come in front of the heater element. Make sure the cable is secured to the stand.**



4.2 The Infra Red Dryer with two heater elements



- Step 1 : Place both heater elements with the front of the heater element laying flat on a protected surface (e.g.: the cardboard shipping carton).
- Step 2 : Turn the heater clamp at the rear of the heater element counter clockwise (at each side) to unlock the tube brackets
- Step 3 : Position the tube brackets so that the rectangular portions are parallel with one another. Turn the heater clamp at the rear of the heater element clockwise to lock the tube brackets.



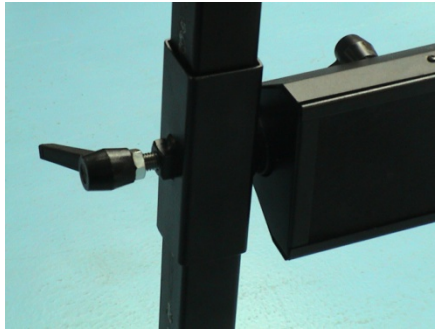
- Step 4 : Lay the stands flat on the floor such that when stood up they are at the approximately distance needed for connecting to each end of the heater element.

⚠ Caution ⚠

- **Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.**

- Step 5 : Locate the heater elements between the two stands on the floor.
- Step 6 : Each person hold one stand with the masts vertical and the feet parallel.
- Step 7 : Use your other hand to simultaneously lift one of the heater elements and slide it over the top of the stand.
- Step 8 : Locate the heater element at the desired height above the floor.

Step 9 : Lock one end of the heater element to the stand with one of the heater clamps.



Step 10 : Use the tube level mounted on the rear of the heater element to level the heater element. Once in place, use the other heater clamp to lock it.



Step 11 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

Step 12 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.

Step 13 : Turn the heater clamps at the rear of the heater element to lock the heater element.

Step 14 : Slide the heater control unit over the right stand.



Step 15 : Connect the heater element cable at the bottom of the heater control unit.

⚠ Caution ⚠

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

Step 16 : Simultaneously lift the heater elements and slide it over the top of the stand to install the second heater.

Step 17 : Locate the heater element at the desired height above the floor and first heater element.

Step 18 : Lock one end of the heater element to the stand with one of the heater clamps.

Step 19 : Use the tube level mounted on the rear of the heater element to level the heater element. Once in place, use the other heater clamp to lock it.

Step 20 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

- Step 21 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.
- Step 22 : Turn the heater clamps at the rear of the heater element clockwise to lock the heater element.
- Step 23 : Slide the heater control unit over the right stand.
- Step 24 : Connect the heater element cable at the bottom of the heater control unit.

 Caution

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

4.3 The Infra Red Dryer with two heater elements next to each other



- Step 1 : Place both heater elements with the front of the heater element laying flat on a protected surface (e.g.: the cardboard shipping carton).
- Step 2 : Turn the heater clamp at the rear of the heater element counter clockwise to unlock the tube brackets (at both sides).
- Step 3 : Connect the two heaters with the connection tube; turn the heater clamp at the rear of the heater element clockwise to lock the tube brackets.
- Step 4 : Position the tube brackets so that the rectangular portions are parallel with one another. Lock the tube brackets by turning the heater clamp at the rear of the heater element clockwise.



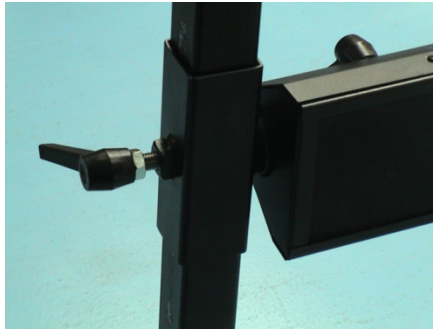
- Step 5 : Lay the stands flat on the floor such that when stood up they are at the approximately distance needed for connecting to each end of the heater element.

⚠ Caution ⚠

- **Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.**

- Step 6 : Locate the heater elements between the two stands on the floor.
- Step 7 : Each person hold one stand with the masts vertical and the feet parallel.
- Step 8 : Use your other hand to simultaneously lift one of the heater elements and slide it over the top of the stand.
- Step 9 : Locate the heater element at the desired height above the floor.

Step 10 : Lock one end of the heater element to the stand with one of the heater clamps.



Step 11 : Use the tube level mounted on the rear of the heater element to level the heater element. Once in place, lock it by using the other heater clamp.



Step 12 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

Step 13 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.

Step 14 : Turn the heater clamps at the rear of the heater element clockwise to lock the heater element.

Step 15 : Slide the heater control unit over the right stand.



Step 16 : Connect the heater element cable at the bottom of the heater control unit.

⚠ Caution ⚠

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

Step 17 : To install the second heater, you must simultaneously lift the heater elements and slide it over the top of the stand.

Step 18 : Locate the heater element at the desired height above the floor and first heater element.

Step 19 : Lock one end of the heater element to the stand with one of the heater clamps.

Step 20 : Use the tube level mounted on the rear of the heater element to level the heater element. Once in place, use the other heater clamp to lock it.

Step 21 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

- Step 22 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.
- Step 23 : Turn the heater clamps at the rear of the heater element clockwise to lock the heater element.
- Step 24 : Slide the heater control unit over the right stand.
- Step 25 : Connect the heater element cable at the bottom of the heater control unit.

 Caution

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

4.4 The Infra Red Dryer with four heater elements



- Step 1 : Place both heater elements with the front of the heater element laying flat on a protected surface (e.g.: the cardboard shipping carton).
- Step 2 : Turn the heater clamp at the rear of the heater element counter clockwise to unlock the tube brackets (on both sides).
- Step 3 : Connect the two heaters with the connection tube; turn the heater clamp at the rear of the heater element clockwise to lock the tube brackets.
- Step 4 : Connect the two other heaters in the same way. Make sure that the connection tube is well fixed
- Step 5 : Position the tube brackets so that the rectangular portions are parallel with one another. Turn the heater clamp at the rear of the heater element clockwise to lock the tube brackets.



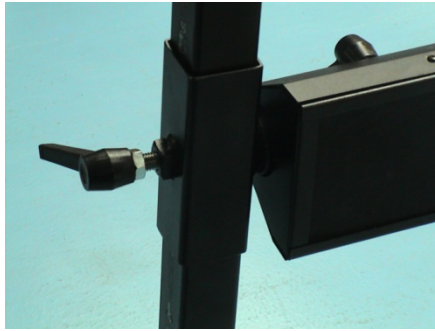
- Step 6 : Lay the stands flat on the floor such that when stood up they are at the approximately distance needed for connecting to each end of the heater element.

⚠ Caution ⚠

- **Make sure that the positioning scale on the base of each stand is at the same side and that the plastic wire clips on the stand will be on the outside of the completed assembly.**

- Step 7 : Locate the heater elements between the two stands on the floor.
- Step 8 : Each person hold one stand with the masts vertical and the feet parallel.
- Step 9 : Use your other hand to simultaneously lift one of the heater elements and slide it over the top of the stand.
- Step 10 : Locate the heater element at the desired height above the floor.

Step 11 : Lock one end of the heater element to the stand with one of the heater clamps.



Step 12 : Use the tube level mounted on the rear of the heater element to level the heater element. Once in place, use the other heater clamp to lock it.



Step 13 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

Step 14 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.

Step 15 : Turn the heater clamps at the rear of the heater element clockwise to lock the heater element.

Step 16 : Slide the heater control unit over the right stand.



Step 17 : Connect the heater element cable at the bottom of the heater control unit.

⚠ Caution ⚠

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

Step 18 : To install the second heater, you must simultaneously lift the heater elements and slide it over the top of the stand.

Step 19 : Locate the heater element at the desired height.

Step 20 : Lock one end of the heater element to the stand with one of the heater clamps.

Step 21 : Using the tube level mounted on the rear of the heater element to level the heater element. Once in place, use the other heater clamp to lock it.



Step 22 : Turn the heater clamps at the rear of the heater element counter clockwise to unlock the heater element.

Step 23 : Rotate the heater element so that its front is vertical and on the same side of the positioning scale on the stand.

Step 24 : Turn the heater clamps at the rear of the heater element clockwise to lock the heater element.

Step 25 : Slide the heater control unit over the right stand.

Step 26 : Connect the heater element cable at the bottom of the heater control unit.

 Caution

- **Make sure that the heater control unit is not at the same side of the heated plane and make sure that the control button is facing up.**

5 CONNECTING THE POWER CABLE

⚠ Important ⚠

- Use the recommended power cable. Using another cable may result in electric shock or fire.
- Never use a damaged power cable. Doing so may result in electric shock or fire.
- The disconnect device is the plug on the power supply cord.

The Infra Red Dryer is available in a width of 64inch (1625 mm) (maximum 5, 2 A), 72 inch (1828.8 mm) (maximum 5, 2 A), 90 inch (2286 mm) (maximum 7, 1 A), 108 inch (2743, 2 mm) (maximum 8, 2 A) or 130 inch (3302 mm) (maximum 8, 2 A)

⚠ Important ⚠

- Use a separate network when using two heater elements. Connecting too many loads on one electrical output could cause fire.

- **Power supply:**

- Voltage: 200 to 240 VAC
- Frequency: 50 Hz $\pm$ 1 Hz

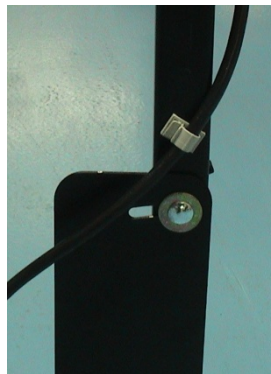
To connect the power cable, please follow the steps mentioned below.

Step 1 : Make sure that the Infra Red Dryer is powered OFF.

Step 2 : Plug the power cable correctly to the outlet.

⚠ Important ⚠

- Make sure that the power cable does not come in front or touches the heater element(s). Doing so may result in fire. Use the cable clamp attached to the stand to lock the power cable.



6 PREPARING FOR A JOB

6.1 Positioning the Infra Red Dryer

⚠ Important ⚠

- Be careful not to touch the heater element(s) during or after operation. Doing so may result in burns.
- Do not hold your hand in front of the heater element(s) during or after operation. Doing so may result in burns.

⚠ Important ⚠

- Take care when determining the Infra Red Dryer location to assure that these waves will be absorbed by the ink and substrate to be cured, and not other surfaces that could be affected by being warmed.

⚠ Important ⚠

- **DO NOT LEAVE THE IR DRYER UNATTENDED.** Always make sure that the printed media does not come in contact with the heater element(s). Contact could not only damage your prints but could also cause the media to overheat. Prolonged contact may even cause fire

⚠ Notes ⚠

- The Infra Red Dryer utilizes an infrared heating technology, which means that the energy waves are emitted perpendicularly from the flat surface on the heater front. Drying of the ink occurs when these waves are absorbed by the ink and media.

Step 1 : Load the media into the printer.

Step 2 : Loosen the positioning bracket and move it to the desired place on the positioning scale.



The front of the heater element(s) should be parallel to the media.

⚠ Notes ⚠

- Make sure that the heater is not aiming directly onto the tensioning bar. The tensioning bar will heat up and could damage the print.

⚠ Notes ⚠

- For the Toucan 64" 6-colour, Toucan 87" 6-colour, Osprey 75", Osprey 102", Spitfire 100 Extreme and Blizzard use a stand with two heater elements.
- When using the Toucan 64" 6-colour, Toucan 87" 6-colour, Osprey 75", Osprey 102" and ViperTX 90" for high speed printing, it is recommended to reposition the heater elements under a different angle.

⚠ Notes ⚠

- For an indication of the distance, please refer to the chapter “indication table”.

Step 3 : Wheel the Infra Red Dryer in front of the printer.

Step 4 : Wheel the Infra Red Dryer until the position bracket is against the winding system.

⚠ Notes ⚠

- During pauses move the IR heaters away from the printer.

Step 5 : When using an Infra Red Dryer with 2 heater elements:

- position the upper unit below the paper guide of the printer,
- position the second element approximately 12cm lower than the upper one

When using an Infra Red Dryer with 1 heater element:

- position the element below the paper guide of the printer



6.2 Switching the power ON.

Important

- Be careful not to touch or hold your hands in front of the heater element(s) during or after operation. Doing so will result in burns.

Caution

- Use an infrared temperature gun to measure the temperature of the heater element safely (without touching the heater element). You can buy this infrared temperature gun in any local technical shop.

Step 1 : Apply pressure to rotate the button on the heater control unit clockwise from the OFF position until it “clicks-on”.

Step 2 : Check that the green indicator light illuminates.

Step 3 : Check that the element begins to emit heat (without touching the heater element).

Caution

- When operating the Infra Red Dryer, solvents evaporate much faster. Therefore we do recommend using an Air Purification System when working with the IR dryer.

6.3 Switching the power OFF.

Important

- Be careful not to touch or hold your hands in front of the heater element(s) during or after operation. Doing so will result in burns.

Step 1 : Apply pressure to rotate the button on the heater control unit counter clockwise to the OFF position until it “clicks-OFF”.

Caution

- Always switch the power OFF when the Infra Red Dryer is not in use.

Important

- Please note that the heater element(s) remains hot for approximately 15 to 20 minutes, even after powering OFF. So it is very important to move away the IR dryer when the print job is finished.

6.4 Setting the correct temperature

- Be careful not to touch or hold your hands in front of the heater element(s) during or after operation. Doing so will result in burns.

⚠ Important ⚠

- Be careful not to touch or hold your hands in front of the heater element(s) during or after operation. Doing so will result in burns.

⚠ Notes ⚠

- Before starting a print job, perform a little testprint to make sure the settings of the IR dryer are OK.

Step 1 : Position the Infra Red Dryer so that you cover the max possible length of the print. Make sure not to aim the heater to the swing bar, this to protect the print.

Step 2 : Apply pressure to rotate the button on the heater control unit clockwise from the OFF position until it "clicks-on".



Step 3 : Check that the green indicator light illuminates.

Step 4 : Rotate the button on the heater control unit to the desired position.

Depending on the distance, printing speed, media type, ink type, a temperature must be selected.

As a result of the large media market, it is impossible to define a correct setting for all media types. Also depending on the printing speed, type of media, type of ink, environmental conditions (specifically humidity) and the amount of ink deposited, the distance to the printer and the temperature settings can vary.

⚠ Caution ⚠

- Check the specification sheet of the media. Make sure to maximum use a setting 10°C (18 °F) lower than the maximum temperature mentioned on the specification sheet of the media. Use an infrared temperature gun to measure the temperature on the media.

Step 5 : Check that the IR dryer begins to emit heat.

⚠ Notes ⚠

- Use an infrared temperature gun to safely measure the temperature of the heater element. You can buy this infrared temperature gun in any local technical shop.
- The actual temperature on the media is not the same as the temperature of the heater element. Use a temperature gun to measure the temperature on the media.

Step 6 : Allow approximately 10 minutes for the infra Red Dryer to initially "warm-up".

Step 7 : Check the heater setting. Make sure that the media does not curl as a result of the Infra Red Dryer. If this happens, reduce the amount of energy emitted by rotating the button on the heater control unit counter clockwise or enlarge the distance between the Infra Red Dryer and the printer.

⚠ Important ⚠

- **Overheating can cause media deformation (curling). This can result in contact between the media and the Infra Red Dryer front, causing permanent damage or fire. In case of emergency, remove the Infra Red Dryer from the media.**

⚠ Notes ⚠

- The optimum temperature setting of the IR dryer is reached when emitting enough energy to cure the images without adding additional heat.

⚠ Notes ⚠

- We recommend to develop a personal table with settings regarding, printer, media, distance, temperature, ...

Step 8 : Switch OFF the power when not using the Infra Red Dryer.

⚠ Important ⚠

- **Please note that the heater element remains hot for approximately 15 to 20 minutes, even after powering OFF. When the print job is finished, feed some extra media to protect the print.**

6.5 Indication table for banner material

As a result of the large media market, it is impossible to define the correct distance between the Infra Red Dryer and the printer or to define the temperature setting for all media types. Also depending on the printing speed, type of media, type of ink, environmental conditions (specifically humidity) and the amount of ink deposited, the distance to the printer and the temperature settings can vary.

Always check the heater setting. Make sure that the media does not curl as a result of the Infra Red Dryer. Simply reduce the amount of energy emitted by rotating the button on the heater control unit counter clockwise or enlarge the distance between the Infra Red Dryer and the printer.

⚠ Caution ⚠

- **Check the specification sheet of the media. Make sure to maximum use a setting 10°C (18F) lower than the maximum temperature mentioned on the specification sheet of the media. Use an infrared temperature gun to measure the temperature on the media.**

⚠ Important ⚠

- **Overheating can cause media deformation (curling). This can result in contact between the media and the Infra Red Dryer front, causing permanent damage or fire. In case of emergency, remove the Infra Red Dryer from the media.**

Please find below a table containing some indications on how to position the Infra Red Dryer and which temperature setting to use based on **banner** material.

These recommended settings may vary depending on which profile is being used and the print speed.

Printer	Distance to printer	Distance to media	Temperature Setting	Measured temperature on media
Mutoh's Rockhopper 3 65 "	±17 cm	± 16 cm	70 %	±70°C
Mutoh's Rockhopper 3 90 " (2 heater elements; not tilted)	±17 cm	± 16 cm	70 %	±70°C
Mutoh's Rockhopper 3 Extreme 65"	±17 cm	± 16 cm	70 %	±70°C
Mutoh's Rockhopper 3 Extreme 90" (2 heater elements; not tilted)	±17 cm	± 16 cm	70 %	±70°C
Mutoh's Osprey 75" (2 heater elements; tilted)	24 cm	± 7 cm	70 %	±70°C
Mutoh's Osprey 108" (2 heater elements; tilted)	24 cm	± 7 cm	70 %	±70°C
Mutoh's Osprey 130"	24 cm	± 7 cm	70 %	±70°C
Spitfire 100 (Extreme)	±17 cm	± 16 cm	70 %	±70°C
Blizzard	±17 cm	± 16 cm	70 %	±70°C

- (*) When using a tilted stand, the distance to the media is variable when using or not using the take-up system. When no take-up system is used or when you are not printing with a take-up system, the first value indicates the distance to the media. During printing in combination with a take-up system, the second value indicates the distance to the media.

Please note that the mentioned distance to the printer is the readable distance on the positioning scale after setting the positioning brackets



⚠ Notes ⚠

- We recommend developing a personal table with settings regarding, printer, media, distance, temperature, ...

7 APPENDIX

7.1 Recommended configuration for Mutoh series printers

	HEAT-STAND	HEAT64	HEAT72	HEAT90	HEAT108	HEAT-TUBE*
ValueJet 1614	1	1				
Rockhopper 3 / Spitfire Extreme 65	1	1				
Rockhopper 3 / Spitfire Extreme 90	1			1		
Blizzard 65	1	2				
Blizzard 90	1			2		
Spitfire 100 Extreme	1				2	
Osprey 75	1		2			
Osprey 102	1				2	
Osprey 130	1	4				2
Viper TX 65	1	1				
Viper TX 90	1			1		
Viper TX 65 Extreme	1	1				
Viper TX 90 Extreme	1			1		
Viper TX 100	1				1	

* : HEAT-TUBE required to connect 2 x 64" heater elements

7.2 Power consumption

HEAT64	5.4 A
HEAT72	6.1 A
HEAT90	7.7 A
HEAT108	9.1 A